

# MEMS

## Clearinghouse

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Property	Value	Conditions	Reference
Compressive strength	0.5655 .. 1.3793 GPa	Ceramic,at temp=25 C	CRC Materials Science and Engineering Handbook, p.419
<del>Density</del>	3200 kg/m^3	Single crystal.	Proceedings of IEEE, Vol 70, No.5, May 1982, p.421
<del>Density</del>	3217 kg/m^3	hexagonal	CRC Materials Science and Engineering Handbook, p.50
<del>Density</del>	3210 kg/m^3	cubic	CRC Materials Science and Engineering Handbook, p.50
Electrical resistivity	1 .. 1e+10 O*m	Ceramic,at temp=20 C	CRC Materials Science and Engineering Handbook, p.564
Hardness,Knoop (KH)	2480 kg/mm/mm	Single crystal.	Proceedings of IEEE, Vol 70, No.5, May 1982, p.421
Hardness,Knoop (KH)	2960 kg/mm/mm	100g,Ceramic,black	CRC Materials Science and Engineering Handbook, p.471
Hardness,Knoop (KH)	2745 kg/mm/mm	100g,Ceramic,green	CRC Materials

			Science and Engineering Handbook, p.471
Heat capacity	1.09 J/mol/K	Ceramic,at temp=540 C.	CRC Materials Science and Engineering Handbook, p.262
Heat capacity	1.13 J/mol/K	Ceramic,at temp=700 C.	CRC Materials Science and Engineering Handbook, p.262
Heat capacity	1.25 J/mol/K	Ceramic,at temp=1000 C.	CRC Materials Science and Engineering Handbook, p.262
Heat capacity	1.34 J/mol/K	Ceramic,at temp=1200 C.	CRC Materials Science and Engineering Handbook, p.262
Heat capacity	1.38 J/mol/K	Ceramic,at temp=1350 C.	CRC Materials Science and Engineering Handbook, p.262
Heat capacity	1.46 J/mol/K	Ceramic,at temp=1550 C.	CRC Materials Science and Engineering Handbook, p.262
Modulus of Rupture	0.1862 GPa	Ceramic,at room temperature	CRC Materials Science and Engineering Handbook, p.532

Modulus of Rupture	0.1724 GPa	Ceramic, at temp=1300 C	CRC Materials Science and Engineering Handbook, p.532
Modulus of Rupture	0.0759 GPa	Ceramic, at temp=1400 C	CRC Materials Science and Engineering Handbook, p.532
Modulus of Rupture	0.1034 GPa	Ceramic, at temp=1800 C	CRC Materials Science and Engineering Handbook, p.532
Modulus of Rupture	0.2897 GPa	Ceramic, with 1 wt% B additive	CRC Materials Science and Engineering Handbook, p.532
Poisson's Ratio	0.183 .. 0.192	Ceramic, at room temperature, density=3128 kg/m/m/m	CRC Materials Science and Engineering Handbook, p.537
Tensile strength	0.03448 .. 0.1379 GPa	Ceramic, at temp=25 C	CRC Materials Science and Engineering Handbook, p.405
Thermal conductivity	350 W/m/K	Single crystal.	Proceedings of IEEE, Vol 70, No.5, May 1982, p.421
Yield strength	21 GPa	Single crystal.	Proceedings of IEEE, Vol 70, No.5, May 1982, p.421
Young's Modulus	700 GPa	Single crystal.	Proceedings of IEEE, Vol

			70, No. 5, May 1982, p. 421
Young's Modulus	401.38 GPa	Ceramic, density=3128 kg/m <sup>3</sup> , at room temperature	CRC Materials Science and Engineering Handbook, p. 507
Young's Modulus	410.47 GPa	Ceramic, density=3120 kg/m <sup>3</sup> , at room temperature	CRC Materials Science and Engineering Handbook, p. 507



Product Number: 35,739-1

Product Name: Silicon carbide, -400 mesh

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Click Here](#)[Product Information](#)

Molecular Formula: SiC

[Price/Availability](#)

Molecular Weight: 40.10

[Certificate of Analysis](#)

CAS Number: 409-21-2

[MSDS](#)[Structure Image](#)

MDL Number: MFCD00049531

[Signatures](#)

Form Aspect: -400 mesh

[Print Preview](#)

Density: 3.230

[Bulk Quote](#)

EC Number: 206-991-8

[Ask A Scientist](#)

Merck Index: 12,8636

Miscellaneous: This chemical is in the EPA inventory under TSCA.

Label Precautions: Irritating dust

Avoid inhalation

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Product Number: 37,809-7

Product Name: Silicon carbide, 200-450 mesh

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Molecular Formula: SiC

[Price/Availability](#)

Molecular Weight: 40.10

[Certificate of Analysis](#)

CAS Number: 409-21-2

[MSDS](#)

MDL Number: MFCD00049531

[Structure Image](#)[Signatures](#)

Form Aspect: 200-450 mesh

[Print Preview](#)

Density: 3.217

[Bulk Quote](#)

EC Number: 206-991-8

[Ask A Scientist](#)

Merck Index: 12,8636

Miscellaneous: This chemical is in the EPA inventory under TSCA.

Label Precautions: Irritating dust

Avoid inhalation

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